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Thank you to Chairwoman Maloney, Chairman Khanna, Ranking Member Comer, and members of the subcommittee for this opportunity to testify today.

My name is Peter Erickson, and I am a senior scientist and the climate policy program director of the Stockholm Environment Institute's U.S. Center, a research affiliate of Tufts University. My research focuses on the economics and climate consequences of oil and gas extraction and use.

Today my testimony has three main points: (1) Fossil fuel subsidies are an inefficient means of supporting economic activity. (2) They undermine efforts to deal with climate change. And (3) they aggravate the need for improvements in public health.

First, fossil fuel subsidies are an inefficient means of supporting economic activity.

The United States government has subsidized fossil fuel production for more than a century, including by forgiving otherwise required tax payments, through the intangible drilling cost provision and the percentage depletion allowance in the Internal Revenue Code.

The ostensible rationale for these subsidies has been to promote increased production and jobs. However, the vast majority of the value of subsidies goes to new oil and gas wells that are already expected to be profitable and would be developed anyway.

For example, at recent average oil and gas prices (\$64 per barrel oil and \$2.60/mmBtu of gas), my colleagues and I estimate that over 96% of subsidy value would flow directly to excess profits, over and above the profits that would be required to satisfy minimum investment hurdles.¹

Most of the value of these subsidies is therefore not contributing to jobs on the ground.

Even in the few cases where subsidies do lead to increased investment, subsidizing fossil fuels is not an efficient means of creating jobs.

For example, a recent review of fiscal policy measures found that spending in renewables infrastructure would generate almost three times as many full-time jobs compared to spending on fossil fuels.² If job creation is the goal of subsidies, other industries, besides fossil fuels, are better job creators.

Second, fossil fuel subsidies undermine efforts to deal with climate change.³

The process of extracting and combusting oil and gas releases both carbon dioxide and methane emissions, both of which are greenhouse gases.

Addressing dangerous climate change requires winding down emissions from burning fossil fuels. In my research with colleagues, we have used energy scenarios compiled by the Intergovernmental Panel on Climate Change to evaluate how continued production and combustion of fossil fuels compares with the long-term emissions and temperature goals of the Paris Agreement.

In particular, limiting warming to the 1.5°C goal of the Paris Agreement would see global coal, oil, gas production declining each year by about 11%, 4%, and 3%, respectively, over the next decade.⁶

Subsidies to fossil fuel producers work against this outcome, and against the emission reductions required to satisfy the Paris Agreement. They make production and combustion of fossil fuels higher than they would otherwise be, especially during periods of very low oil and gas prices when companies have little or no incentive to drill and pump without them.^{4,5} But whenever these subsidy-driven increases occur, even when relatively small, they still raise global greenhouse gas emissions, undercutting other hard won gains against climate threats.^{1,7}

In addition, besides the direct effects on production and emissions, fossil fuel subsidies also have other adverse impacts on attainment of climate goals. Extra cash flow made available by subsidies can be used not only for drilling, but also for promoting fossil fuels and for political activities that can result in further favoritism towards the fossil fuel industry.⁷

Subsidies can also have symbolic effects, since their continued existence may be read by other nations as a sign that the US government is not taking its commitments to subsidy reform, and consequently climate change action, as seriously as it should be.

For example, in May of 2016, with other G7 governments gathered in Japan, the US committed to eliminate “inefficient” fossil fuel subsidies by 2025^{8,9}. By following through on this commitment, the US would be encouraging other countries to do the same, which would therefore multiply the benefits.

Third, fossil fuel subsidies aggravate the need for improvements in public health.

Subsidies to fossil fuels also contribute to air and water pollution at the community level, working against important public health needs.

For example, my research has found that the intangible drilling cost and percentage depletion subsidies contributed billions of dollars to the valuations of new oil and gas fields in the Appalachian basin between 2008 and 2011, fueling a rapid increase of drilling for shale gas in that region.¹⁰

But, the cumulative costs of the ensuing damage to public health from air pollution in the region substantially outweighed benefits from oil and gas sector employment.¹¹ Further, the economic prosperity that was envisioned by promoters has not materialized.¹²

Exposure to air pollution from oil and gas drilling can also exacerbate socioeconomic inequalities. For example, in the Eagle Ford basin in Texas, it is low-income and Hispanic residents who have been disproportionately exposed to gas flaring.¹³

Closing thoughts

Opponents of fossil fuel subsidy reform often take the position that the long-recognized provisions in the US tax code, like the IDC and percentage depletion allowances, are not subsidies. These opponents often argue that these measures are not subsidies specifically *because* they have existed in the tax code for so long.

But that is wrong. Policy measures and other government support that change the balance sheet of companies at a cost to the public, whether provided through the tax code or otherwise, constitute just as much a subsidy as writing a check, if they provide financial benefits that are not generally available to other industries.^{14,15}

Not only do the IDC and percentage depletion measure meet that definition, but so do many other policy preferences that extend well beyond the tax code.⁴

Regulatory loopholes around cleaning up pollution from abandoned fossil fuel extraction sites, and exemptions from proper management and disposal of hazardous wastes, each provide targeted financial benefits to fossil fuels companies, while also leading to additional, indirect public health impacts.¹ Similarly, systematically inadequate fees for plugging and abandoning oil wells have led to an outstanding cleanup bill of hundreds of billions of dollars that may well be transferred from corporations to the public.^{1,16}

In summary, subsidies to fossil fuel producers hold back the low-carbon energy transition. Fossil fuel subsidies are an inefficient means of supporting economic activity, they undermine efforts to limit climate change, and they aggravate the need for improvements in public health. Government support would be better spent, helping both the economy and the climate, by instead advancing other public policy aims.

Removing fossil fuel subsidies can be an important part of addressing the climate crisis.

Thank you to the committee for this important hearing.

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